

## THE CLAIMS DEFINING THE INVENTION ARE AS FOLLOWS:-

1. A percutaneous lead assembly for supplying electrical signals to a medical device implanted within a body of a patient, said lead assembly comprising a flexible elongate member having a first portion adapted to remain external to the body of a patient, said first portion having a first diameter; and a second portion joined to said first portion and adapted to extend through a hole in a skin layer of the body of the patient, and wherein said second portion having a second diameter which is substantially smaller than said first diameter.
2. The percutaneous lead assembly as claimed in claim 1, wherein said first portion includes a shielding layer.
3. The percutaneous lead assembly as claimed in claim 1 or claim 2, wherein at least a segment of said second portion is covered with a textured surface.
4. The percutaneous lead assembly as claimed in claim 1, wherein said first portion and said second portion are joined by connectors.
5. The percutaneous lead assembly as claimed in claim 1, wherein said percutaneous lead assembly includes a lead restraint.
6. An external lead restraint for use with a percutaneous lead, wherein said lead is implanted within a body of a patient and extends through a hole in the patient's skin and characterised in that an excess length of lead is releasably secured near to the hole by releasable securing means affixed to the patient's skin.
7. A percutaneous lead assembly for supplying electrical signal to a medical device implanted within a body of a patient, wherein said lead assembly has

a flexible elongate member including a first unshielded portion that extends through a hole in a skin layer of the body of the patient; and a second shielded portion which is joined to said first unshielded portion at a site external to the body of the patient.